

## Virginia Title V Operating Permit

Until such time as this permit is reopened and revised, modified, revoked, terminated or expires, the permittee is authorized to operate in accordance with the terms and conditions contained herein. This permit is issued under the authority of Title 10.1, Chapter 13, §10.1-1322 of the Air Pollution Control Law of Virginia. This permit is issued consistent with the Administrative Process Act, and 9 VAC 5-80-50 through 9 VAC 5-80-305 of the State Air Pollution Control Board Regulations for the Control and Abatement of Air Pollution of the Commonwealth of Virginia.

Authorization to operate a Stationary Source of Air Pollution as described in this permit is hereby granted to:

Permittee Name:	Greif Bros. Corporation
Mailing Address:	P.O. Box 339 Amherst, VA 24521
Facility Name:	Greif Bros. Corporation
DEQ Registration Number:	30549
Facility Location:	861 Fibre Plant Road, Riverville, Virginia
AIRS Identification No.:	51-009-0022

<u>Permit Number</u>	<u>Effective Date</u>	<u>Expiration Date</u>
VA-30549	November 19, 2001	November 19, 2006

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Dennis H. Treacy  
Director, Department of Environmental Quality

November 19, 2001  
Signature Date

Table of Contents, 2 pages  
Permit Conditions, 46 pages

## Table of Contents

<b>I. Facility Information.....</b>	<b>1</b>
<b>II. Emission Units.....</b>	<b>2</b>
A. Significant Emissions Units (See Note 2 for abbreviations) .....	2
B. Insignificant Emission Units.....	5
<b>III. Fuel Burning Equipment Requirements.....</b>	<b>6</b>
A. B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02).....	6
B. B&W Package Boiler – Spare (Ref. No. BLR03) .....	9
C. Foster Wheeler Combination Boiler (Ref. No. BLR05) .....	14
<b>IV. Process Equipment Requirements .....</b>	<b>19</b>
A. Woodyard Equipment Requirements (Ref. No. WDY01) .....	19
B. Unbleached Pulp Mill Equipment Requirements .....	20
C. Chemical Recovery Equipment Requirements .....	22
D. #1 Paper Machine Equipment Requirements.....	25
E. #2 Paper Machine Equipment Requirements – (Ref. No. PM04).....	27
<b>V. MACT Requirements for Startup, Shutdown, and Malfunction Plan.....</b>	<b>28</b>
<b>VI. MACT I (40 CFR 63 Subpart S) Requirements.....</b>	<b>31</b>
A. MACT I Limitations .....	31
B. MACT I Monitoring and Testing.....	32
C. MACT I Recordkeeping.....	32
D. MACT I Reporting.....	33
<b>VII. MACT II (40 CFR 63 Subpart MM) Requirements.....</b>	<b>33</b>
A. MACT II Limitations .....	33
B. MACT II Monitoring .....	34
C. MACT II Testing.....	34
D. MACT II Recordkeeping .....	35
E. MACT II Reporting.....	36
<b>VIII. Facility Wide Conditions .....</b>	<b>37</b>
New source standard for visible emissions .....	37
<b>IX. Permit Shield &amp; Inapplicable Requirements .....</b>	<b>37</b>
<b>X. General Conditions .....</b>	<b>38</b>
A. Enforceability.....	38
B. Permit Expiration.....	38
C. Recordkeeping and Reporting.....	38
D. Annual Compliance Certification.....	39
E. Permit Deviation Reporting .....	40
F. Failure/Malfunction Reporting.....	40

G.	Severability.....	40
H.	Duty to Comply.....	41
I.	Need to Halt or Reduce Activity not a Defense.....	41
J.	Permit Action for Cause.....	41
K.	Property Rights .....	42
L.	Duty to Submit Information.....	42
M.	Duty to Pay Permit Fees .....	42
N.	Fugitive Dust Emission Standards .....	42
O.	Startup, Shutdown, and Malfunction.....	43
P.	Inspection and Entry Requirements .....	43
Q.	Reopening For Cause.....	44
R.	Permit Availability.....	44
S.	Transfer of Permits.....	44
T.	Malfunction as an Affirmative Defense.....	45
U.	Permit Revocation or Termination for Cause .....	45
V.	Duty to Supplement or Correct Application.....	46
W.	Stratospheric Ozone Protection.....	46
X.	Accidental Release Prevention.....	46

## **I. Facility Information**

### **Permittee**

Greif Bros. Corporation  
P.O. Box 339  
Amherst, VA 24521

### **Responsible Official**

Michael A. Giles  
Executive Vice President and Chief Operating Officer

### **Facility**

Greif Bros. Corporation  
861 Fibre Plant Road, Riverville, VA  
Amherst County

### **Contact Person**

Mr. John Petchul  
Environmental Engineer  
(804) 933-4117

**AIRS Identification Number:** 51-009-0022

**Facility Description:** SIC Code 2631 – Greif Bros., Inc. is a manufacturer of semichemical corrugated medium and recycled liner board covered by Standard Industrial Classification (SIC) Code 2631. The facility has one semichemical paper machine and one recycled paperboard machine, and associated process equipment. Two natural gas/residual oil boilers, one combination fuel boiler, one chemical recovery boiler, and one natural gas/distillate oil spare boiler provide the steam requirements to the facility.

## II. Emission Units

Equipment to be operated consists of:

### A. Significant Emissions Units (See Note 2 for abbreviations)

Emission Unit ID	Stack ID	Emission Unit Description	Size/Rated Capacity (Note 1)	Pollution Control Device (PCD) Description	PCD ID	Pollutant Controlled	Applicable Permit Date
<b>Fuel Burning Equipment</b>							
BLR01	BLRSV01	B&W Package Boiler –North, Fired By Natural Gas and Residual Oil, 1975	224.6 MMBtu/hr	Low NOx Burner, 2000	----	Nitrogen Oxides	April 30, 1998
BLR02	BLRSV01	B&W Package Boiler – South, Fired By Natural Gas and Residual Oil, 1975	224.6 MMBtu/hr	----	----	----	April 3, 1973
BLR03	BLRSV03	B&W Package Boiler – Spare, Fired by Natural Gas and Distillate Oil, 1965	100 MMBtu/hr	----	----	----	October 13, 2000
BLR05	BLRSV05	Foster Wheeler Combination Boiler, Fired by Natural Gas, Woodwaste, Tire Derived Fuel (TDF), and Old Corrugated Container Reject Material (OCCR), 2000	244 MMBtu/hr	Research Cottrell Electrostatic Precipitator, 2000	BLRCD05	PM	April 30, 1998
<b>Woodyard</b>							
WDY01	WDYSV01 (fugitive)	Various Woodyard Equipment and Vehicular Traffic	----	----	----	----	April 3, 1973
<b>Unbleached Pulp Mill</b>							
UPM01	UPMSV01 (fugitive)	Bauer M&D Digester System, 1975	26 ODTP/hr	NCG Control System in accordance with MACT I	BLRSV05 (primary) BLRSV03 (backup)	Total HAP	April 3, 1973

Emission Unit ID	Stack ID	Emission Unit Description	Size/Rated Capacity (Note 1)	Pollution Control Device (PCD) Description	PCD ID	Pollutant Controlled	Applicable Permit Date
UPM03	UPMSV03	IMPCO #1 Brownstock Washer, 1975	26 ODTP/hr	----	----	----	April 3, 1973
UPM04	UPMSV04	IMPCO #2 Brownstock Washer, 1975	26 ODTP/hr	----	----	----	April 3, 1973
UPM05	UPMSV05	IMPCO #3 Brownstock Washer, 1975	26 ODTP/hr	----	----	----	April 3, 1973
UPM07	UPMSV07	RECO Combined Condensate Tank, 1975	4,174 gal	NCG Control System in accordance with MACT I	BLRSV05 (primary) BLRSV03 (backup)	Total HAP	----
<b>Chemical Recovery</b>							
CR01	CRSV01	RECO Weak Liquor Storage Tanks (2), 1975	988,887 gal	----	----	----	April 3, 1973
CR03	CRSV03	RECO Heavy Black Liquor Storage Tank, 1975	120,132 gal	----	----	----	April 3, 1973
CR04	CRSV04	Nash Evaporator Vacuum Pump, 1975	26 ODTP/hr	NCG Control System in accordance with MACT I	BLRSV05 (primary) BLRSV03 (backup)	Total HAP	April 3, 1973
CR05	CRSV05	B&W Recovery Boiler, 1975	11.7 TBLS/hr, 625 gal #6 oil/hr	B&W Dry Bottom 3 Field Electrostatic Precipitator	CRCDD05	PM	April 3, 1973
CR06	CRSV06	RECO Smelt Dissolving Tank, 1975	11.7 TBLS/hr	----	----	----	April 3, 1973

Emission Unit ID	Stack ID	Emission Unit Description	Size/Rated Capacity (Note 1)	Pollution Control Device (PCD) Description	PCD ID	Pollutant Controlled	Applicable Permit Date
<b>#1 Paper Machine</b>							
PM01	PMSV01 (fugitive)	RECO #1 Paper Machine HD Storage Tank, 1975	615,628 gal	----	----	----	April 3, 1973
PM02	PMSV02 (fugitive)	Beloit #1 Paper Machine Wet End	40 ADTFP/hr	----	----	----	April 3, 1973
PM03	PMSV03 (fugitive)	Beloit #1 Paper Machine Dry End, 1975	40 ADTFP/hr	----	----	----	April 3, 1973
<b>#2 Paper Machine</b>							
PM04	PMSV04 (fugitive)	Beloit #2 Paper Machine, including starch silo, 1993	45 ADTFP/hr	----	----	----	May 12, 1992, as amended October 5, 1994 and February 22, 1995
<b>Wastewater Treatment Plant</b>							
WWT01	WWTSV01 (fugitive)	Wastewater Treatment Plant, 1975	7.0 MGD	----	----	----	April 3, 1973

Notes:

1. The Size/Rated capacity is provided for informational purposes only, and is not an applicable requirement.
2. Abbreviations: ADTFP = Air Dried Ton of Finished Paper; OTP = Oven Dry Tons of Pulp; TBLS = Tons of Black Liquor Solids

## B. Insignificant Emission Units

The following emission units at the facility are identified in the application as insignificant emission units under 9 VAC 5-80-720:

Emission Unit No.	Emission Unit Description	Citation 9 VAC 5-80-720_	Pollutant(s) Emitted (9 VAC 5-80-720 B)	Rated Capacity (9 VAC 5-80-720 C)
BLR07	Boiler Water, Steam and Condensate Treatment Storage Tanks	A	----	----
BLR08	Boiler Fuel Oil Storage Tanks (#6 and #2)	B	VOC	----
BLR09	Fly Ash Handling	B	Particulate Matter	----
WDY02	Log Debarking	B	Particulate Matter	----
WDY03	Chipping	B	Particulate Matter	----
WDY04	Screening	B	Particulate Matter	----
WDY05	Fines Handling	B	Particulate Matter	----
WDY06	Roundwood Unloading/Loading	B	Particulate Matter	----
WDY07	Pile Erosion (Chips, Bark and Logs)	B	Particulate Matter	----
WDY08	Chip Transport	B	Particulate Matter	----
WDY09	Bark Hogging	B	Particulate Matter	----
WDY10	Fuel Handling	B	Particulate Matter	----
UPM06	Defoamer Storage Tanks	B	VOC	----
UPM08	Chip Presteamer	B	VOC	----
CR02	Intermediate Liquor Tank	B	Acetaldehyde, MEK, Benzene, MIBK, Toluene, M-, O-, P-Xylene, Styrene, Methanol, VOC	----
CR06	Precipitator Mix Tank	B	Acetaldehyde, MEK, Benzene, Styrene, Methanol, VOC	----
CR07	Green Liquor System (Dregs Washer, Green Liquor Clarifier, and Cooking Liquor Mix Tank)	B	Acetaldehyde, MEK, Benzene, Styrene, Methanol, VOC	----
CR08	Chemical Recovery and Pulp Mill Tank Farm (Phosphoric Acid Storage Tanks, Caustic Storage Tanks and Railcars, Soda Ash Storage Tanks and Railcars, HCl Storage Tank, Neutralizing Tank)	A	----	----
PM05	#1 and #2 Paper Machine Hydraulic Drive System Storage Tanks	B	VOC	----
REC01	OCC Facility	B	VOC	----
WWT02	Wastewater Treatment Chemical Storage Tanks (Polymers, Nutrients and Sodium Hydrochlorite)	B	VOC	----
WWT03	Land Application System	B	Particulate Matter	----
WWT04	Compost System	B	Particulate Matter	----



MIS01	Rolling Stock Fuel Storage Tanks (Diesel, Unleaded Gas)	B	VOC	----
MIS02	Used Oil Storage Tanks	B	VOC	----
MIS03	Landfill	B	Particulate Matter	----
MIS04	Solvent Based Parts Washer	B	VOC	----

These emission units are presumed to be in compliance with all requirements of the federal Clean Air Act as may apply. Based on this presumption, no monitoring, recordkeeping, or reporting shall be required for these emission units in accordance with 9 VAC 5-80-110.

### **III. Fuel Burning Equipment Requirements**

#### **A. B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

##### **1. Limitations for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

- a. Nitrogen oxide emissions from the B&W Package Boiler – North (Ref. No. BLR01) shall be controlled by low NO<sub>x</sub> burners and flue gas recirculation.  
(9 VAC 5-80-110, 9 VAC 5-80-10 H, and Condition 8 of April 30, 1998 Permit)
- b. The approved fuels for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) are natural gas and residual oil. Residual oil is defined as fuel oil that meets the specifications for fuel oil numbers 4, 5, or 6 under the American Society for Testing and Materials, "Standard Specification for Fuel Oils". A change in the fuels may require a permit to modify and operate.  
(9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 9 of April 30, 1998 Permit)
- c. The maximum sulfur content of the residual oil to be burned in either the B&W Package Boiler – North (Ref. No. BLR01) or the B&W Package Boiler – South (Ref. No. BLR02) shall not exceed 2.5% percent by weight per shipment.  
(9 VAC 5-80-110 E)
- d. The B&W Package Boiler – North (Ref. No. BLR01) shall consume no more than 4,000,000 gallons per year of residual oil, calculated monthly as the sum of each consecutive twelve-(12) month period.  
(9 VAC 5-80-110, and Condition 10 of April 30, 1998 Permit)

- e. Emissions from the operation of each B&W Package Boiler (ie., the North boiler (Ref. No. BLR01) and the South boiler (Ref. No. BLR02)) shall not exceed the limits specified below:

Particulate Matter            0.22 lbs/MMBtu

Sulfur Dioxide                592.9 lbs/hr

(9 VAC 5-80-110, 9 VAC 5-40-900, and 9 VAC 5-40-930)

- f. Visible emissions from the combined stack for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) shall not exceed 20 percent opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30 percent opacity as determined by EPA Method 9 (reference 40 CFR 60, Appendix A). This condition applies at all times except during startup, shutdown, and malfunction.  
(9 VAC 5-80-110 and 9 VAC 5-50-80)
- g. The permittee shall take the following measures in order to minimize the duration and frequency of excess emissions, with respect to the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) and their respective air pollution control equipment which affect such emissions:
- (1) Develop a maintenance schedule and maintain records of all scheduled and non-scheduled maintenance to air pollution control equipment.
  - (2) Maintain an inventory of spare parts that are needed to minimize durations of air pollution control equipment breakdowns.
  - (3) Have available written operating procedures for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) and their respective air pollution control equipment. These procedures shall be based on the manufacturer's recommendations, at a minimum.
  - (4) Train operators in the proper operation of all such equipment and familiarize the operators with the written operating procedures. The permittee shall maintain records of the training provided including the names of trainees, the date of training and the nature of the training.

Records of maintenance and training shall be maintained on site for a period of five years and shall be made available to DEQ personnel upon request.

(9 VAC 5-80-110, 9 VAC 5-50-20 E, Conditions 20 and 21 of April 30, 1998 Permit)

**2. Monitoring for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

- a. At least one time per calendar week, an observation for the presence of visible emissions from the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) combined stack shall be made. If visible emissions are observed the permittee shall:
  - (1) take timely corrective action such that the boiler(s) resumes operation with no visible emissions, or,
  - (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the stack do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the boiler(s) resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain a log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If neither of the boilers have been operated during the week, it shall be noted in the log that the boilers were not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

**3. Recordkeeping for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

- a. The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:
  - (1) The annual consumption of residual oil in the B&W Package Boiler – North (Ref. No. BLR01), calculated monthly as the sum of each consecutive twelve-(12) month period.
  - (2) The percent sulfur of the residual oil received, per shipment.
  - (3) Records of malfunctions of equipment which may cause a violation of any part of this permit.
  - (4) Operating procedures, maintenance schedules, training, and service records for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02).

- (5) Visual emission log for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) combined stack.
- (6) B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02) operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.

(9 VAC 5-80-110, 9 VAC 5-50-50, and Condition 23 of April 30, 1998 Permit)

**4. Testing for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.

(9 VAC 5-50-30, 9 VAC 5-80-110, and Condition 19 of April 30, 1998 Permit)

**5. Reporting for the B&W Package Boiler – North (Ref. No. BLR01) and the B&W Package Boiler – South (Ref. No. BLR02)**

The permittee shall submit written reports in accordance with General Condition X.C. (9 VAC 5-80-110 F)

**B. B&W Package Boiler – Spare (Ref. No. BLR03)**

**1. Limitations for the B&W Package Boiler – Spare (Ref. No. BLR03)**

- a. The approved fuels for the B&W Package Boiler – Spare (Ref. No. BLR03) are natural gas and distillate oil. Distillate oil is defined as fuel oil that meets the specifications for fuel oil numbers 1 or 2 under the American Society for Testing and Materials “Standard Specification for Fuel Oils.” A change in the fuels may require a permit to modify and operate.  
(9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 4 of October 13, 2000 Permit)
- b. The maximum sulfur content of the distillate oil to be burned in the B&W Package Boiler – Spare (Ref. No. BLR03) shall not exceed 0.5% percent by weight per shipment.  
(9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 6 of October 13, 2000 permit)
- c. The consumption of each fuel in the 100 MMBtu/hr input standby boiler must be such that each of the following equations are satisfied monthly for each consecutive twelve (12) month period:

(1)

$$\frac{(EF_{\#2-NOx} \times A \div 1000 \text{ gal}) + (EF_{NG-NOx} \times B \div 10^6 \text{ cf})}{2000 \text{ lb / ton}} \leq EL_{NOx}$$

where

$EF_{\#2-NOx}$  = Emission factor for #2 distillate oil, in units of pound of nitrogen oxides per 1000 gallons of #2 distillate oil burned = 20

A = Annual consumption of #2 distillate oil, in units of gallons per year, calculated monthly as the sum of each consecutive twelve (12) month period

$EF_{NG-NOx}$  = Emission factor for natural gas, in units of pound of nitrogen oxides per million cubic feet of natural gas burned = 140

B = Annual consumption of natural gas, in units of cubic feet per year, calculated monthly as the sum of each consecutive twelve (12) month period

$EL_{NOx}$  = Annual emission limit for nitrogen oxides, given in Condition III.B.1.d of this permit, in units of tons per year = 39.4

(2)

$$\frac{(EF_{\#2-SOx} \times A \div 1000 \text{ gal}) + (EF_{NG-SOx} \times B \div 10^6 \text{ cf})}{2000 \text{ lb / ton}} \leq EL_{SOx}$$

where

$EF_{\#2-SOx}$  = Emission factor for #2 distillate oil, in units of pound of sulfur dioxide per 1000 gallons of #2 distillate oil burned = 71

A = Annual consumption of #2 distillate oil, in units of gallons per year, calculated monthly as the sum of each consecutive twelve (12) month period

$EF_{NG-SOx}$  = Emission factor for natural gas, in units of pound of sulfur dioxide per million cubic feet of natural gas burned = 0.6

B = Annual consumption of natural gas, in units of cubic feet per year, calculated monthly as the sum of each consecutive twelve (12) month period

$EL_{SOx}$  = Annual emission limit for sulfur dioxide, given in Condition III.B.1.d of this permit, in units of tons per year = 39.4

The above equations must be satisfied monthly for each consecutive twelve-(12) month period. In no event shall actual emission rates of any pollutant from burning any fuel exceed those rates represented by the emission factors, given above, for each pollutant and fuel.

(9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 5 of October 13, 2000 Permit)

- d. Emissions from the operation of the B&W Package Boiler – Spare (Ref. No. BLR03) shall not exceed the limits specified below:

Particulate Matter	1.41 lbs/hr	-----	(9 VAC 5-50-260)
PM-10	0.74 lbs/hr	-----	(9 VAC 5-50-260)
Sulfur Dioxide	49.98 lbs/hr	39.4 tons/yr	(9 VAC 5-50-260)
Nitrogen Oxides (as NO <sub>2</sub> )	14.08 lbs/hr	39.4 tons/yr	(9 VAC 5-50-260)
Carbon Monoxide	8.16 lbs/hr	-----	(9 VAC 5-50-260)
Volatile Organic Compounds	0.53 lbs/hr	-----	(9 VAC 5-50-260)

These emissions are derived from the estimated overall emission contribution from operating limits. Exceedance of the operating limits may be considered credible evidence of the exceedance of emission limits. Compliance with the annual emission limits may be determined as stated in Condition III.B.1.c and III.B.3.a.

(9 VAC 5-80-110, and Condition 8 of October 13, 2000 Permit)

- e. Visible Emissions from the B&W Package Boiler – Spare stack (Ref. No. BLR03) shall not exceed 20 percent opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30 percent opacity as determined by EPA Method 9 (reference 40 CFR 60, Appendix A).  
 (9 VAC 5-80-110, 9 VAC 5-50-80, and Condition 9 of October 13, 2000 Permit)
- f. The B&W Package Boiler – Spare (Ref. No. BLR03) emissions shall be controlled by proper operation and maintenance. Boiler operators shall be trained in the proper operation of all such equipment. Training shall consist of a review and familiarization of the manufacturer's operating instructions, at minimum.  
 (9 VAC 5-80-110)

## 2. Monitoring for the B&W Package Boiler – Spare (Ref. No. BLR03)

- a. The B&W Package Boiler – Spare (Ref. No. BLR03) shall be equipped with a device to continuously measure and record the hourly consumption of each fuel. The monitoring device shall be installed, maintained, calibrated and operated in

accordance with approved procedures which shall include, as a minimum, the manufacturer's written requirements or recommendations. The monitoring device shall be provided with adequate access for inspection and shall be in operation when the B&W Package Boiler – Spare (Ref. No. BLR03) is operating.  
(9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 3 of October 13, 2000 Permit)

- b. The permittee shall obtain a certification from the fuel supplier with each shipment of distillate oil. Each fuel supplier certification shall include the following:

- (1) The name of the fuel supplier;
- (2) The date on which the distillate oil was received;
- (3) The quantity (in gallons) of distillate oil delivered in the shipment; and
- (4) A statement that the distillate oil complies with the American Society for Testing and Materials specifications for numbers 1 or 2 fuel oil.

(9 VAC 5-80-110, and Condition 7 of October 13, 2000 Permit)

- c. At least one time per calendar week, an observation for the presence of visible emissions from the B&W Package Boiler – Spare stack (Ref. No. BLR03) shall be made. If visible emissions are observed the permittee shall:

- (1) take timely corrective action such that the boiler resumes operation with no visible emissions, or,
- (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the boiler stack do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the boiler resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain a boiler log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the boiler has not been operated during the week, it shall be noted in the boiler log that the boiler was not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

**3. Recordkeeping for the B&W Package Boiler – Spare (Ref. No. BLR03)**

- a. The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:
  - (1) The amount of each fuel burned in the 100 MMBtu/hr input standby boiler, per year, calculated monthly as the sum of each consecutive twelve-(12) month period.
  - (2) The results of the calculations for nitrogen oxide and sulfur dioxide emissions from the boiler using the equations shown in Condition III.B.1.c, to demonstrate compliance with the annual emission limits stated in Condition III.B.1.d, calculated monthly as the sum of each consecutive twelve (12) month period.
  - (3) All fuel supplier certifications.
  - (4) Visual emission log for the B&W Package Boiler – Spare (Ref. No. BLR03).
  - (5) Records of malfunctions of equipment which may cause a violation of any part of this permit.
  - (6) Operating procedures, maintenance schedules, training, and service records for the B&W Package Boiler – Spare (Ref. No. BLR03).
  - (7) B&W Package Boiler – Spare (Ref. No. BLR03) operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.

(9 VAC 5-50-50, 9 VAC 5-80-110, and Condition 10 of October 13, 2000 Permit)

**4. Testing for the B&W Package Boiler – Spare (Ref. No. BLR03)**

- a. The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.  
(9 VAC 5-80-110, 9 VAC 5-50-30, and Condition 15 of April 7, 2000 Permit)



- b. If the results of the nitrogen oxide emission calculations required in Condition III.B.3.a(2) exceeds 50% of the annual emission limit in Condition III.B.1.d, then a performance test for nitrogen oxides from the B&W Package Boiler – Spare (Ref. No. BLR03) shall be required within 120 days of the determination of this exceedance to determine compliance with the emission limits contained in Condition III.B.1.d. If required, this test shall be performed once each five year permit term.

If the results of the sulfur dioxide emission calculations required in Condition III.B.3.a(2) exceeds 50% of the annual emission limit in Condition III.B.1.d, then a performance test for sulfur dioxide from the B&W Package Boiler – Spare (Ref. No. BLR03) shall be required within 120 days of the determination of this exceedance to determine compliance with the emission limits contained in Condition III.B.1.d. If required, this test shall be performed once each five year permit term.

Tests shall be conducted and reported and data reduced as set forth in 9 VAC 5-50-30, and the test methods and procedures contained in each applicable section or subpart listed in 9 VAC 5-50-410. The details of the tests are to be arranged with the Director, South Central Regional Office. The permittee shall submit a test protocol at least 30 days prior to testing. Two copies of the test results shall be submitted to the South Central Regional Office within 60 days after test completion and shall conform to the test report format enclosed with this permit. (9 VAC 5-80-110 E)

**5. Reporting for the B&W Package Boiler – Spare (Ref. No. BLR03)**

The permittee shall submit written reports in accordance with General Condition X.C.  
(9 VAC 5-80-110 F)

**C. Foster Wheeler Combination Boiler (Ref. No. BLR05)**

**1. Limitations for the Foster Wheeler Combination Boiler (Ref. No. BLR05)**

- a. Particulate matter emissions from the Foster Wheeler Combination Boiler (Ref. No. BLR05) shall be controlled by an Electrostatic Precipitator (ESP). The ESP shall be equipped with a device for the continuous measurement of primary and secondary current and voltage (by field) across the ESP. The device shall be installed in an accessible location and shall be maintained by the permittee such that it is in proper working order at all times. The ESP shall be provided with adequate access for inspection.  
(9 VAC 5-80-110, 9 VAC 5-80-10 H, 9 VAC 5-50-260, and Condition 3 of April 30, 1998 Permit)

- b. Nitrogen oxide emissions from the Foster Wheeler Combination Boiler (Ref. No. BLR05) shall be controlled by low NO<sub>x</sub> burners for natural gas.  
 (9 VAC 5-80-110, 9 VAC 5-80-10 H, 9 VAC 5-50-260, and Condition 4 of April 30, 1998 Permit)
- c. The approved fuels for the Foster Wheeler Combination Boiler (Ref. No. BLR05) are natural gas, woodwaste, Tire Derived Fuel (TDF), and Old Corrugated Container Reject material (OCCR). "Woodwaste" is defined as wood feed stock, bark, and other wood wastes capable of being hogged. This definition does not include wood contaminated with paints, plastics, finishing material or chemical treatments. A change in the fuels may require a permit to modify and operate.  
 (9 VAC 5-80-110, 9 VAC 5-80-10, and Condition 5 of April 30, 1998 Permit)
- d. The Foster Wheeler Combination Boiler (Ref. No. BLR05) fuel feed stream shall contain 30 percent or less by weight Municipal-type Solid Waste (MSW) as measured on a calendar quarter basis.  
 (9 VAC 5-80-110, 9 VAC 5-80-10 H, and Condition 6 of April 30, 1998 Permit)
- e. The Foster Wheeler Combination Boiler (Ref. No. BLR05) shall consume no more than the following amounts of each approved fuel:

natural gas	178.1 X 10 <sup>6</sup> cubic feet per year;
woodwaste	195,525 tons per year;
TDF	2.4 tons per hour and 747 tons per year; and
OCCR	4.8 tons per hour, and 21,000 tons per year.

Each annual limit shall be calculated monthly as the sum of each consecutive twelve-(12) month period.  
 (9 VAC 5-80-110, and Condition 7 of April 30, 1998 Permit)

- f. Emissions from the operation of the Foster Wheeler Combination Boiler (Ref. No. BLR05) shall not exceed the limits specified below:

Particulate Matter	0.1 lbs/MMBtu	54.9 tons/yr	(9 VAC 5-50-260) (40 CFR 60.43b)
PM-10	7.47 lbs/hr	25.0 tons/yr	(9 VAC 5-50-260) (40 CFR 60.43b)
Sulfur Dioxide	103.15 lbs/hr	38.8 tons/yr	(9 VAC 5-50-260)
Nitrogen Oxides (as NO <sub>2</sub> )	73.20 lbs/hr	313.3 tons/yr	(9 VAC 5-50-260)
Carbon Monoxide	130.07 lbs/hr	494.7 tons/yr	(9 VAC 5-50-260)

Volatile Organic Compounds	26.27 lbs/hr	95.6 tons/yr	(9 VAC 5-50-260)
Formaldehyde	0.17 lbs/hr	0.7 tons/yr	(9 VAC 5-50-180)
Cobalt	0.01 lbs/hr	-----	(9 VAC 5-50-180)
HCl	10.25 lbs/hr	15.4 tons/yr	(9 VAC 5-50-180)

(9 VAC 5-80-110 and Condition 12 of April 30, 1998 Permit)

- g. Visible emissions from the ESP stack on the Foster Wheeler Combination Boiler (Ref. No. BLR05) shall not exceed 10 percent opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 27 percent opacity. This condition applies at all times except during start-up, shutdown, or malfunction.  
(9 VAC 5-80-110, 9 VAC 5-50-260, 9 VAC 5-50-20, 9 VAC 5-50-410, 40 CFR 60.43b, and Condition 13 of April 30, 1998 Permit)
- h. The permittee shall take the following measures in order to minimize the duration and frequency of excess emissions, with respect to the Foster Wheeler Combination Boiler (Ref. No. BLR05) and its respective air pollution control equipment which affect such emissions:
- (1) Develop a maintenance schedule and maintain records of all scheduled and non-scheduled maintenance to air pollution control equipment.
  - (2) Maintain an inventory of spare parts that are needed to minimize durations of air pollution control equipment breakdowns.
  - (3) Have available written operating procedures for the Foster Wheeler Combination Boiler (Ref. No. BLR05) and its respective air pollution control equipment. These procedures shall be based on the manufacturer's recommendations, at a minimum.
  - (4) Train operators in the proper operation of all such equipment and familiarize the operators with the written operating procedures. The permittee shall maintain records of the training provided including the names of trainees, the date of training and the nature of the training.

Records of maintenance and training shall be maintained on site for a period of five years and shall be made available to DEQ personnel upon request.  
(9 VAC 5-80-110, 9 VAC 5-50-20 E, Conditions 20 and 21 of April 30, 1998 Permit)

- i. Except as specified in this permit, the Foster Wheeler Combination Boiler (Ref. No. BLR05) is to be operated in compliance with Federal emissions requirements under 40 CFR 60, Subpart Db.  
(9 VAC 5-80-110, 9 VAC 5-50-410, and Condition 11 of April 30, 1998 Permit)

## **2. Monitoring for the Foster Wheeler Combination Boiler (Ref. No. BLR05)**

- a. A continuous emissions monitoring system shall be installed to measure and record opacity from the ESP stack on the Foster Wheeler Combination Boiler (Ref. No. BLR05). The monitoring system shall conform to the design specifications stipulated in 40 CFR 60, Appendix B, Performance Specification 1. The monitoring systems shall be installed, maintained, evaluated, calibrated and operated in accordance with 40 CFR 60.13, 40 CFR 60 Subpart Db, and 40 CFR 60, Appendix B. During all periods of boiler operation, the monitoring system shall be in continuous operation except for system breakdowns, repairs, calibration checks, and zero and span adjustments.  
(9 VAC 5-80-110, 9 VAC 5-50-40 F, 40 CFR 60.48b, and Condition 17 of April 30, 1998 Permit)
- b. After the initial performance evaluation, the permittee shall conduct opacity monitoring system audits, on a regularly scheduled basis, to demonstrate compliance with the calibration error specification (40 CFR 60, Appendix B, Performance Specification 1). In no case shall the length of time between audits exceed twelve months. A 30-day notification prior to each scheduled audit shall be submitted to the South Central Regional Office.  
(9 VAC 5-80-110, 9 VAC 5-170-160, 9 VAC 5-50-40 F, and Condition 17 of April 30, 1998 Permit)
- c. The continuous monitoring data generated by the opacity monitor may, at the discretion of the Board, be used as evidence of violation of the emission standards. These data shall be kept on file for the most recent five-(5) years and made available to the Department upon request.  
(9 VAC 5-80-110)

## **3. Recordkeeping for the Foster Wheeler Combination Boiler (Ref. No. BLR05)**

- a. The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:
  - (1) The daily and annual consumption for each approved fuel in the Foster Wheeler Combination Boiler (Ref. No. BLR05). Each annual consumption rate shall be calculated monthly as the sum of each consecutive twelve-(12) month period.  
(40 CFR 60.49b)

- (2) The weight percent of MSW in the Foster Wheeler Combination Boiler (Ref. No. BLR05) fuel feed stream on a calendar quarter basis.
- (3) Records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the Foster Wheeler Combination Boiler (Ref. No. BLR05); any malfunction of the air pollution control equipment; and any periods during which a continuous monitoring system or monitoring device is inoperative.
- (4) All continuous monitoring data.
- (5) Operating procedures, maintenance schedules, training, and service records for the Foster Wheeler Combination Boiler (Ref. No. BLR05).
- (6) Foster Wheeler Combination Boiler (Ref. No. BLR05) operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.

(9 VAC 5-50-50, 9 VAC 5-80-110, and Condition 23 of April 30, 1998 Permit)

#### **4. Testing for the Foster Wheeler Combination Boiler (Ref. No. BLR05)**

- a. The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.  
(9 VAC 5-50-30, 9 VAC 5-80-110, and Condition 19 of April 30, 1998 Permit)
- b. Once each permit term, at a frequency not to exceed five years, performance tests shall be performed for particulate matter and PM-10 from the Foster Wheeler Combination Boiler (Ref. No. BLR05), to determine compliance with the emission limits contained in Condition III.C.1.f. These periodic performance tests shall be performed not later than six months prior to the expiration date of this permit. Tests shall be conducted and reported and data reduced as set forth in 9 VAC 5-50-30, and the test methods and procedures contained in each applicable section or subpart listed in 9 VAC 5-50-410. The details of the tests are to be arranged with the Director, South Central Regional Office. The permittee shall submit a test protocol at least 30 days prior to testing. Two copies of the test results shall be submitted to the South Central Regional Office within 60 days after test completion and shall conform to the test report format enclosed with this permit.  
(9 VAC 5-50-30, 9 VAC 5-50-410, and 9 VAC 5-80-110 E).

#### **5. Reporting for the Foster Wheeler Combination Boiler (Ref. No. BLR05)**

- a. The permittee shall submit a report of monitored excess emissions and monitor performance semiannually. The reports are to be submitted, postmarked no later than 30 calendar days after the end of each semiannual period, to the South

Central Regional Office. The details and format of the report are to be arranged with the South Central Regional Office prior to the submission of the first report. (9 VAC 5-80-110, 9 VAC 5-170-160, 9 VAC 5-50-40 F, and Condition 17 of April 30, 1998 Permit)

- b. The permittee shall submit written reports in accordance with General Condition X.C.  
(9 VAC 5-80-110 F)

## **IV. Process Equipment Requirements**

### **A. Woodyard Equipment Requirements (Ref. No. WDY01)**

For the following listed applicable requirement types, there are no unit specific requirements for the Woodyard Equipment (Ref. No. WDY01): **Testing, Monitoring, Reporting, or Recordkeeping.**

#### **1. Limitations for the Woodyard Equipment**

During the construction, modification, or operation of a stationary source or any other building, structure, facility, or installation, no owner or other person shall cause or permit any materials or property to be handled, transported, stored, used, constructed, altered, repaired, or demolished without taking reasonable precautions to prevent particulate matter from becoming airborne. Such reasonable precautions may include, but are not limited to, the following:

- a. Use, where possible, of water or chemicals for control of dust in the demolition of existing buildings or structures, construction operations, the grading of roads, or the clearing of land;
- b. Application of asphalt, water, or suitable chemicals on dirt roads, materials stockpiles, and other surfaces which may create airborne dust; the paving of roadways and the maintaining of them in a clean condition;
- c. Installation and use of hoods, fans, and fabric filters to enclose and vent the handling of dusty material. Adequate containment methods shall be employed during sandblasting or other similar operations;
- d. Open equipment for conveying or transporting material likely to create objectionable air pollution when airborne shall be covered or treated in an equally effective manner at all times when in motion; and,
- e. The prompt removal of spilled or tracked dirt or other materials from paved streets and of dried sediments resulting from soil erosion.

(9 VAC 5-50-90)

## **B. Unbleached Pulp Mill Equipment Requirements**

The Unbleached Pulp Mill equipment includes, but is not limited to, the Digester System (Ref. No. UPM01), #1 Brownstock Washer (Ref. No. UPM03), #2 Brownstock Washer (Ref. No. UPM04), #3 Brownstock Washer (Ref. No. UPM05), and Combined Condensate Tank (Ref. No. UPM07)

### **1. Limitations for the Unbleached Pulp Mill Equipment**

- a. No later than April 16, 2001, the permittee shall control the total HAP emissions from the Low Volume, High Concentration system. The Low Volume, High Concentration (LVHC) system means the collection of equipment including the digester and evaporator systems, and any other equipment serving the same function as those previously listed. See section VI of this permit, for specific limitations for the LVHC system.  
(9 VAC 5-80-110 and 40 CFR 63 Subpart S)
- b. Visible emissions from the Unbleached Pulp Mill Equipment shall not exceed 20% opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30% opacity.  
(9 VAC 5-50-80 and 9 VAC 5-80-110)

### **2. Monitoring for the Unbleached Pulp Mill Equipment**

- a. At least one time per calendar week, an observation for the presence of visible emissions from the Unbleached Pulp Mill Equipment shall be made. If visible emissions are observed, the permittee shall:
  - (1) take timely corrective action such that the equipment resumes operation with no visible emissions, or,
  - (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the equipment do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the equipment resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain an equipment log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the equipment has not been operated during the week, it shall be noted in the equipment log that the equipment was not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

- b. See section VI of this permit, for additional monitoring requirements for the LVHC system.  
(9 VAC 5-80-110 and 40 CFR 63Subpart S)

### **3. Recordkeeping for the Unbleached Pulp Mill Equipment**

- a. The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:
  - (1) Visual emission log for the Unbleached Pulp Mill Equipment.
  - (2) Records of malfunctions of equipment which may cause a violation of any part of this permit.
  - (3) Unbleached Pulp Mill equipment operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.  
(9 VAC 5-50-50 and 9 VAC 5-80-110)

- b. See section VI of this permit, for additional recordkeeping requirements for the LVHC system.  
(9 VAC 5-80-110 and 40 CFR 63 Subpart S)

### **4. Testing for the Unbleached Pulp Mill Equipment**

- a. The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.  
(9 VAC 5-50-30 and 9 VAC 5-80-110)
- b. See section VI of this permit, for additional testing requirements for the LVHC system.  
(9 VAC 5-80-110 and 40 CFR 63 Subpart S)

### **5. Reporting for the Unbleached Pulp Mill Equipment**

- a. The permittee shall submit written reports in accordance with General Condition X.C.  
(9 VAC 5-80-110 F)
- b. See section VI of this permit, for additional reporting requirements for the LVHC system.  
(9 VAC 5-80-110 and 40 CFR 63 Subpart S)



### **C. Chemical Recovery Equipment Requirements**

The Chemical Recovery Equipment includes, but is not limited to, the #1 and #2 Weak Liquor Storage Tanks (Ref. No. CR01), the Heavy Black Liquor Storage Tank (Ref. No. CR03), the Evaporator Vacuum Pump (Ref. No. CR04), the B&W Recovery Boiler (Ref. No. CR05), and the Smelt Dissolving Tank (Ref. No. CR06)

#### **1. Limitations for the Chemical Recovery Equipment**

- a. No later than March 13, 2004, the permittee shall control the gaseous organic HAP emissions from the semichemical combustion unit. For the purposes of this permit, the semichemical combustion unit is the B&W Recovery Boiler (Ref. No. CR05). See section VII of this permit, for specific limitations for the semichemical combustion unit.  
(9 VAC 5-80-110 and 40 CFR 63 Subpart MM)
- b. Particulate emissions from the B&W Recovery Boiler (Ref. No. CR05) shall be controlled by an electrostatic precipitator. The electrostatic precipitator shall be provided with adequate access for inspection.  
(9 VAC 5-80-110)
- c. Visible emissions from the Chemical Recovery Equipment, with the exception of the B&W Recovery Boiler (Ref. No. CR05), shall not exceed 20% opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30% opacity.  
(9 VAC 5-50-80 and 9 VAC 5-80-110)
- d. Visible emissions from the B&W Recovery Boiler (Ref. No. CR05) shall not exceed 35% opacity.  
(9 VAC 5-40-1710 and 9 VAC 5-80-110)
- e. Emissions from the operation of the B&W Recovery Boiler (Ref. No. CR05) shall not exceed the limits specified below:

Particulate Matter	3.00 lbs/equivalent ton of air dried pulp
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Total hydrocarbons as carbon	See Condition VII.A.3
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(9 VAC 5-80-110, 9 VAC 5-40-1680, and 40 CFR 63.862(c)(2))

- f. Emissions from the operation of the Smelt Dissolving Tank (Ref. No. CR06) shall not exceed the limits specified below:

Particulate Matter	0.75 lbs/equivalent ton of air dried pulp
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(9 VAC 5-80-110 and 9 VAC 5-40-1680)

- g. Emissions from the B&W Recovery Boiler (Ref. No. CR05) shall be controlled by proper operation and maintenance. Boiler operators shall be trained in the proper operation of all such equipment. Training shall consist of a review and familiarization of the manufacturer's operating instructions, at minimum.  
(9 VAC 5-80-110)

## **2. Monitoring for the Chemical Recovery Equipment**

- a. At least one time per calendar week, an observation for the presence of visible emissions from the Chemical Recovery Equipment, with the exception of the B&W Recovery Boiler (Ref. No. CR05), shall be made. If visible emissions are observed, the permittee shall:
  - (1) take timely corrective action such that the equipment resumes operation with no visible emissions, or,
  - (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the equipment do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the equipment resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain an equipment log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the equipment has not been operated during the week, it shall be noted in the equipment log that the equipment was not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

- b. At least one time per calendar week, an observation for the presence of visible emissions from the B&W Recovery Boiler stack (Ref. No. CR05) shall be made. If visible emissions are observed the permittee shall:
  - (1) take timely corrective action such that the boiler resumes operation with no visible emissions, or,
  - (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the boiler stack do not exceed 35 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 35 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the boiler resumes operation with visible emissions of 35 percent or less.

The permittee shall maintain a boiler log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the boiler has not been operated during the week, it shall be noted in the boiler log that the boiler was not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

- c. See section VII of this permit, for additional monitoring requirements for the semichemical combustion unit (Ref. No. CR05).  
(9 VAC 5-80-110 and 40 CFR 63 Subpart MM)

### **3. Recordkeeping for the Chemical Recovery Equipment**

- a. The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:

- (1) Visual emission log for the Chemical Recovery Equipment, with the exception of the B&W Recovery Boiler (Ref. No. CR05).
- (2) Visual emission log for the B&W Recovery Boiler (Ref. No. CR05).
- (3) Records of malfunctions of equipment which may cause a violation of any part of this permit.
- (4) Chemical Recovery equipment operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.  
(9 VAC 5-50-50 and 9 VAC 5-80-110)

- b. The permittee shall have available good written operating procedures and a maintenance schedule for the B&W Recovery Boiler (Ref. No. CR05). These procedures shall be based on the manufacturer's recommendations, at minimum. All records required by this condition shall be kept on site and made available for inspection by the DEQ.  
(9 VAC 5-80-110)
- c. See section VII of this permit, for additional recordkeeping requirements for the semichemical combustion unit (Ref. No. CR05).  
(9 VAC 5-80-110 and 40 CFR 63 Subpart MM)

#### **4. Testing for the Chemical Recovery Equipment**

- a. The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.  
(9 VAC 5-50-30 and 9 VAC 5-80-110)
- b. See section VII of this permit, for additional testing requirements for the semichemical combustion unit (Ref. No. CR05).  
(9 VAC 5-80-110 and 40 CFR 63 Subpart MM)

#### **5. Reporting for the Chemical Recovery Equipment**

- a. The permittee shall submit written reports in accordance with General Condition X.C.  
(9 VAC 5-80-110 F)
- b. See section VII of this permit, for additional reporting requirements for the semichemical combustion unit (Ref. No. CR05).  
(9 VAC 5-80-110 and 40 CFR 63 Subpart MM)

#### **D. #1 Paper Machine Equipment Requirements**

The #1 Paper Machine equipment includes, but is not limited to, the #1 Paper Machine HD Storage Tank (Ref. No. PM01), the #1 Paper Machine Wet End (Ref. No. PM02), and the #1 Paper Machine Dry End (Ref. No. PM03)

##### **1. Limitations for the #1 Paper Machine Equipment**

- a. Visible emissions from the #1 Paper Machine Equipment shall not exceed 20% opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30% opacity.  
(9 VAC 5-50-80 and 9 VAC 5-80-110)

##### **2. Monitoring for the #1 Paper Machine Equipment**

- a. At least one time per calendar week, an observation for the presence of visible emissions from the #1 Paper Machine Equipment shall be made. If visible emissions are observed, the permittee shall:
  - (1) take timely corrective action such that the equipment resumes operation with no visible emissions, or,
  - (2) perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the equipment do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not

demonstrated by this VEE, timely corrective action shall be taken such that the equipment resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain an equipment log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the equipment has not been operated during the week, it shall be noted in the equipment log that the equipment was not operated and that a visual observation was not required. (9 VAC 5-80-110 E.)

### **3. Recordkeeping for the #1 Paper Machine Equipment**

The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:

- a. Visual emission log for the #1 Paper Machine Equipment.
- b. Records of malfunctions of equipment which may cause a violation of any part of this permit.
- c. #1 Paper Machine equipment operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.  
(9 VAC 5-50-50 and 9 VAC 5-80-110)

### **4. Testing for the #1 Paper Machine Equipment**

The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.  
(9 VAC 5-50-30 and 9 VAC 5-80-110)

### **5. Reporting for the #1 Paper Machine Equipment**

The permittee shall submit written reports in accordance with General Condition X.C.  
(9 VAC 5-80-110 F)

## **E. #2 Paper Machine Equipment Requirements – (Ref. No. PM04)**

### **1. Limitations for the #2 Paper Machine Equipment**

- a. The production of paper by the #2 Paper Machine (Ref. No. PM04) shall not exceed 390,550 tons per year, calculated monthly as the sum of each consecutive twelve-(12) month period.  
(9 VAC 5-80-110, 9 VAC 5-170-160 and Condition 3 of May 12, 1992 Permit, as amended October 5, 1994 and February 22, 1995)
- b. Visible emissions from the #2 Paper Machine Equipment (Ref. No. PM04) shall not exceed 20% opacity except during one six-minute period in any one hour in which visible emissions shall not exceed 30% opacity.  
(9 VAC 5-50-80 and 9 VAC 5-80-110)
- c. Emissions from the operation of the #2 Paper Machine (Ref. No. PM04) shall not exceed the limits specified below:

Volatile Organic Compounds	11.33 lbs/hr	38.0 tons/yr
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(9 VAC 5-80-110, 9 VAC 5-50-260 and Condition 4 of May 12, 1992 Permit, as amended October 5, 1994 and February 22, 1995)

### **2. Monitoring for the #2 Paper Machine Equipment**

At least one time per calendar week, an observation for the presence of visible emissions from the #2 Paper Machine Equipment shall be made. If visible emissions are observed, the permittee shall:

- a. take timely corrective action such that the equipment resumes operation with no visible emissions, or,
- b. perform a visible emission evaluation (VEE) in accordance with 40 CFR 60, Appendix A, Method 9 to assure visible emissions from the equipment do not exceed 20 percent opacity. The VEE shall be conducted for a minimum of six minutes. If any of the 15-second-interval observations exceed 20 percent, the VEE shall be conducted for a total of 60 minutes. If compliance is not demonstrated by this VEE, timely corrective action shall be taken such that the boiler resumes operation with visible emissions of 20 percent or less.

The permittee shall maintain an equipment log to demonstrate compliance with this condition. The log shall include the date and time of the observations, the observer's name, whether or not there were visible emissions, any VEE recordings and any necessary corrective action. If the equipment has not been operated during the week, it shall be noted in the equipment log that the equipment was not operated and that a visual observation was not required.  
(9 VAC 5-80-110 E.)

### **3. Recordkeeping for the #2 Paper Machine Equipment**

The permittee shall maintain records of all emission data and operating parameters necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the South Central Regional Office. These records shall include, but are not limited to:

- a. Visual emission log for the #2 Paper Machine Equipment.
- b. Records of malfunctions of equipment which may cause a violation of any part of this permit.
- c. The yearly production of paper by the #2 Paper Machine, calculated monthly as the sum of each consecutive twelve (12) month period.
- d. An annual material balance including the throughput and emissions of VOCs from the #2 Paper Machine. Throughput and emissions shall be calculated monthly as the sum of each consecutive twelve-(12) month period.
- e. #2 Paper Machine equipment operation information, sufficient to calculate annual emissions for each consecutive 12-month period.

These records shall be available on site for inspection by the DEQ and shall be current for the most recent five-(5) years.

(9 VAC 5-50-50, 9 VAC 5-80-110 and Condition 6 of May 12, 1992 Permit, as amended October 5, 1994 and February 22, 1995)

### **4. Testing for the #2 Paper Machine Equipment**

The permitted facility shall be constructed so as to allow for emissions testing at any time using appropriate methods. Upon request from the Department, test ports shall be provided at the appropriate locations.

(9 VAC 5-50-30 and 9 VAC 5-80-110)

### **5. Reporting for the #2 Paper Machine Equipment**

The permittee shall submit written reports in accordance with General Condition X.C. (9 VAC 5-80-110 F)

## **V. MACT Requirements for Startup, Shutdown, and Malfunction Plan**

1. At all times, including periods of startup, shutdown, and malfunction, owners and operators shall operate and maintain any affected facility under the provisions 40 CFR 63 Subpart S and 40 CFR 63 Subpart MM, including associated air pollution control equipment, in a manner consistent with good air pollution control practice for minimizing emissions at least to the levels required by this permit and the State Air Pollution Control Board Regulations for the Control and Abatement of Air Pollution.

- a. Malfunctions shall be corrected as soon as practicable after their occurrence in accordance with the startup, shutdown, and malfunction plan required in Condition V.2.
- b. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the South Central Regional Office, which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures (including the startup, shutdown, and malfunction plan required in Condition V.2), review of operation and maintenance records, and inspection of the source.

(9 VAC 5-80-110, 40 CFR 63.6(e)(1), 40 CFR 63.6(e)(2))

2. The permittee shall develop and implement a written startup, shutdown, and malfunction plan that describes, in detail, procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction and a program of corrective action for malfunctioning process and air pollution control equipment used to comply with the provisions of 40 CFR 63 Subpart S and 40 CFR 63 Subpart MM. The portion of the plan covering affected facilities subject to 40 CFR 63 Subpart S shall be developed by the permittee by April 16, 2001. The portion of the plan covering affected facilities subject to 40 CFR 63 Subpart MM shall be developed by the permittee by March 13, 2004. The plan shall be incorporated by reference into the permittee's Title V permit. (See Condition V.3.) The purpose of the startup, shutdown, and malfunction plan is to:
  - a. Ensure that, at all times, the permittee operates and maintains affected sources, including associated air pollution control equipment, in a manner consistent with good air pollution control practices for minimizing emissions at least to the levels required by the provisions 40 CFR 63 Subpart S and 40 CFR 63 Subpart MM;
  - b. Ensure that the permittee is prepared to correct malfunctions as soon as practicable after their occurrence in order to minimize excess emissions of hazardous air pollutants; and
  - c. Reduce the reporting burden associated with periods of startup, shutdown, and malfunction (including corrective action taken to restore malfunctioning process and air pollution control equipment to its normal or usual manner of operation).

(9 VAC 5-80-110 and 40 CFR 63.6(e)(3))

3. During periods of startup, shutdown, and malfunction, the owner or operator of an affected source shall operate and maintain such source (including associated air pollution control equipment) in accordance with the procedures specified in the startup, shutdown, and malfunction plan developed under Condition V.2.

(9 VAC 5-80-110 and 40 CFR 63.6(e)(3)(ii))



4. When actions taken by the permittee during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) are consistent with the procedures specified in the affected source's startup, shutdown, and malfunction plan, the permittee shall keep records for that event that demonstrate that the procedures specified in the plan were followed. These records may take the form of a checklist, or other effective form of recordkeeping, that confirms conformance with the startup, shutdown, and malfunction plan for that event. In addition, the owner or operator shall keep records of these events as specified in 40 CFR 63.10(b), including records of the occurrence and duration of each startup, shutdown, or malfunction of operation and each malfunction of the air pollution control equipment. Furthermore, the owner or operator shall confirm that actions taken during the relevant reporting period during periods of startup, shutdown, and malfunction were consistent with the affected source's startup, shutdown and malfunction plan in the semiannual report required in Condition X.C.3.  
(9 VAC 5-80-110 and 40 CFR 63.6 (e)(3)(iii))
5. If an action taken by the permittee during a startup, shutdown, or malfunction (including an action taken to correct a malfunction) is not consistent with the procedures specified in the affected source's startup, shutdown, and malfunction plan, the permittee shall record the actions taken for that event and shall report such actions as specified in 40 CFR 63.6 (e)(3)(iv).  
(9 VAC 5-80-110 and 40 CFR 63.6 (e)(3)(iv))
6. The South Central Regional Office may require that the permittee make changes to the startup, shutdown, and malfunction plan if the plan:
  - a. Does not address a startup, shutdown, or malfunction event that has occurred;
  - b. Fails to provide for the operation of the source (including associated air pollution control equipment) during a startup, shutdown, or malfunction event in a manner consistent with good air pollution control practices for minimizing emissions at least to the levels required by this permit; or
  - c. Does not provide adequate procedures for correcting malfunctioning process and/or air pollution control equipment as quickly as practicable.  
(9 VAC 5-80-110 and 40 CFR 63.6(e)(3)(vii))
7. If the startup, shutdown, and malfunction plan fails to address or inadequately addresses an event that meets the characteristics of a malfunction but was not included in the startup, shutdown, and malfunction plan at the time the permittee developed the plan, the permittee shall revise the startup, shutdown, and malfunction plan within 45 days after the event to include detailed procedures for operating and maintaining the source during similar malfunction events and a program of corrective action for similar malfunctions of process or air pollution control equipment.  
(9 VAC 5-80-110 and 40 CFR 63.6(e)(3)(viii))

## **VI. MACT I (40 CFR 63 Subpart S) Requirements**

### **A. MACT I Limitations**

1. For the purposes of this section of this permit, all terms used herein shall have the meaning given them in 40 CFR 63 Subpart A and 40 CFR 63 Subpart S.  
(9 VAC 5-80-110 and 40 CFR 63.441)
2. Unless otherwise required in this permit, the permittee shall comply with the requirements of 40 CFR Part 63 Subpart A, General Provisions, as indicated in 40 CFR Part 63 Subpart S, Table 1, General Provisions Applicability to Subpart S.  
(9 VAC 5-80-110 and 40 CFR 63.440(g))
3. The permittee shall achieve compliance with the conditions of section VI of this permit no later than April 16, 2001.  
(9 VAC 5-80-110, and 40 CFR 63.440(d))
4. The permittee shall control the total HAP emissions from the Low Volume, High Concentration system as specified in Conditions VI.A.5 and VI.A.6. Low Volume, High Concentration system (LVHC) means the collection of equipment including the digester and evaporator systems, and any other equipment serving the same function as those previously listed.  
(9 VAC 5-80-110, 40 CCR 63.441, and 40 CFR 63.443(b))
5. The LVHC equipment systems shall be enclosed and vented into a closed-vent system and routed to a control device that meets the control requirements specified in Condition VI.A.6. The enclosures and closed-vent system shall meet the design requirements specified in Condition VI.A.8.  
(9 VAC 5-80-110, and 40 CFR 63.443(c))
6. The control device used to reduce total HAP emissions from the LVHC system shall use one of the following:
  - (a) a boiler by introducing the HAP emission stream with the primary fuel or into the flame zone; or
  - (b) a boiler with a heat input capacity greater than or equal to 150 million British thermal units per hour by introducing the HAP emission stream with the combustion air.  
(9 VAC 5-80-110, and 40 CFR 63.443(d))
7. Periods of excess emissions reported under Condition X.C.3 shall not be a violation of Condition VI.A.4 provided that the time of excess emissions (excluding periods of startup, shutdown, or malfunction as specified under section V) divided by the total process operating time in a semi-annual reporting period does not exceed one percent.  
(9 VAC 5-80-110 and 40 CFR 63.443(e))

8. Each enclosure and closed-vent system specified in Condition VI.A.5 for capturing and transporting vent streams that contain HAP shall meet the design requirements specified in paragraphs (b) through (d) of 40 CFR 63.450.  
(9 VAC 5-80-110 and 40 CFR 63.450(a))

## **B. MACT I Monitoring and Testing**

1. Each enclosure or closed-vent system specified in Condition VI.A.5 shall comply with the following requirements specified in 40 CFR 63.453(k)(1) through 40 CFR 63.453(k)(6):
  - a. 30-day visual inspections, specified in 40 CFR 63.453(k)(1), 40 CFR 63.453(k)(2), and 40 CFR 63.453(k)(5),
  - b. initial and annual positive pressure section testing, specified in 40 CFR 63.453(k)(3), performed in accordance with the test methods and procedures specified in 40 CFR 63.457 (d),
  - c. initial and annual negative pressure section testing , specified in 40 CFR 63.453(k)(4), performed in accordance with the test methods and procedures specified 40 CFR 63.457(e), and
  - d. corrective actions, specified in 40 CFR 63.453(k)(6).

(9 VAC 5-80-110 and 40 CFR 63.453)

2. The permittee shall control emissions from the LVHC system as specified in Condition VI.A.4. Except as provided in Condition VI.A.7, failure to perform procedures required by section VI of this permit shall constitute a violation of the emission standard and be reported as a period of excess emissions.  
(9 VAC 5-80-110 and 40 CFR 63.453(o))

## **C. MACT I Recordkeeping**

1. The permittee shall comply with the recordkeeping requirements of 40 CFR 63.10 of 40 CFR 63 Subpart A, as shown in 40 CFR 63 Subpart S, Table 1, General Provisions Applicability to Subpart S, and the requirements specified in Conditions VI.C.2 and VI.C.3 for the monitoring parameters specified in subsection VI.B of this permit.  
(9 VAC 5-80-110 and 40 CFR 63.454(a))
2. For each applicable enclosure opening, closed-vent system, and closed collection system specified in Condition VI.A.5, the permittee shall prepare and maintain a site-specific inspection plan including a drawing or schematic of the components of applicable affected equipment and shall record the information listed in 40 CFR 63.454(b)(1) through 40 CFR 63.454(b)(12) for each inspection.  
(9 VAC 5-80-110 and 40 CFR 63.454(b))
3. The permittee shall meet the requirements specified in Condition VI.C.1 for any new affected process equipment or pulping process condensate stream that becomes

subject to the standards in this 40 CFR 63, Subpart S due to a process change or modification.

(9 VAC 5-80-110 and 40 CFR 63.454(d))

#### **D. MACT I Reporting**

1. The permittee shall comply with the reporting requirements of 40 CFR Part 63 Subpart A as specified in 40 CFR Part 63 Subpart S, Table 1, General Provisions and Applicability to Subpart S and all of the requirements specified in subsection VI.D of this permit. The initial notification report specified under Sec. 63.9(b)(2) of subpart A of 40 CFR Part 63 shall be submitted by April 15, 1999.

(9 VAC 5-80-110 and 40 CFR 63.455(a))

2. The permittee shall meet the requirements specified in Condition VI.D.1 upon startup of any new affected process equipment or pulping process condensate stream that becomes subject to the standards in this 40 CFR 63, Subpart S due to a process change or modification.

(9 VAC 5-80-110 and 40 CFR 63.455(d))

### **VII. MACT II (40 CFR 63 Subpart MM) Requirements**

#### **A. MACT II Limitations**

1. For the purposes of this section of this permit, all terms used herein shall have the meaning given them in 40 CFR 63 Subpart A and 40 CFR 63 Subpart MM.
- (9 VAC 5-80-110 and 40 CFR 63.861)
2. Unless otherwise required in this permit, the permittee shall comply with the requirements of 40 CFR Part 63 Subpart A, General Provisions, as indicated in 40 CFR Part 63 Subpart MM, Table 1, General Provisions Applicability to Subpart MM.
- (9 VAC 5-80-110 and 40 CFR 63.860(c))

3. The permittee must ensure that:

- (a) The concentration of gaseous organic HAP, as measured by total hydrocarbons reported as carbon, discharged to the atmosphere from the semichemical combustion unit is less than or equal to 2.97 lb/ton of black liquor solids fired; or
- (b) The gaseous organic HAP emissions from the semichemical combustion unit, as measured by total hydrocarbons reported as carbon, are reduced by at least 90 percent prior to discharge of the gases to the atmosphere.

Semichemical combustion unit means any equipment used to combust or pyrolyze black liquor at stand-alone semichemical pulp mills for the purpose of chemical recovery. For the purposes of this permit, the semichemical combustion unit is the B&W Recovery Boiler (Ref. No. CR05).

(9 VAC 5-80-110, 40 CFR 63.862(c)(2), and 40 CFR 63.861)

4. The permittee must comply with the conditions of section VII of this permit no later than March 13, 2004.  
(9 VAC 5-80-110 and 40 CFR 63.863(a))

## **B. MACT II Monitoring**

1. The permittee must monitor the parameters as approved by the Administrator or his/her delegate using the methods and procedures in Condition VII.B.2.  
(9 VAC 5-80-110 and 40 CFR 63.864(a)(5))
2. The permittee for an affected source or process unit seeking to demonstrate compliance with the standards in Condition VII.A.3 using a control technique other than those listed in 40 CFR 63.864(a)(1) through (3) must provide to the Administrator or his/her delegate a monitoring plan that includes a description of the control device, test results verifying the performance of the control device, the appropriate operating parameters that will be monitored, and the permittee for the affected source or process unit must install, calibrate, operate, and maintain the monitor(s) in accordance with the monitoring plan approved by the Administrator or his/her delegate. The permittee must include in the information submitted to the Administrator or his/her delegate proposed performance specifications and quality assurance procedures for the monitors. The Administrator or his/her delegate may request further information and will approve acceptable test methods and procedures.

The permittee shall submit the monitoring plan to the Administrator or his/her delegate at least 60 days before the initial performance test is scheduled to begin. A copy of this submittal, and any follow-up submittals related to monitoring plan approval, shall also be sent to the South Central Regional Office. The permittee may submit the monitoring plan well in advance of the submittal date specified above to ensure a timely review by the Administrator or his/her delegate in order to meet the compliance demonstration date specified in Condition VII.C.1 This permit may require amendment or modification to incorporate provisions of the approved monitoring plan.

(9 VAC 5-80-110, 40 CFR 63.865(f), and 40 CFR 63.8(f))

## **C. MACT II Testing**

1. The permittee is required to conduct an initial performance test using the test methods and procedures listed in 40 CFR 63.7 and 40 CFR 63.865. The permittee shall perform the initial performance test within 180 days after the compliance date.  
(9 VAC 5-80-110, 40 CFR 63.864(b)(1), and 40 CFR 63.7(a))
2. Determination of operating ranges.
  - (a) During the initial performance test required in Condition VII.C.1, the permittee must establish operating ranges for the monitoring parameters in Condition VII.B.2; or

- (b) The permittee may base operating ranges on values recorded during previous performance tests or conduct additional performance tests for the specific purpose of establishing operating ranges, provided that test data used to establish the operating ranges are or have been obtained using the test methods required in 40 CFR 63 Subpart MM. The permittee must certify that all control techniques and processes have not been modified subsequent to the testing upon which the data used to establish the operating parameter ranges were obtained.

(9 VAC 5-80-110 and 40 CFR 63.864(b))

3. On-going compliance provisions.

- (a) After March 13, 2004, the permittee is required to implement corrective action, as specified in the startup, shutdown, and malfunction plan prepared under section V of this permit when any 3-hour average value is outside the range of parameter values established in Condition VII.C.2.  
(9 VAC 5-80-110 and 40 CFR 63.864 (c)(1)(iv))
- (b) After March 13, 2004, the permittee is in violation of the standards of Condition VII.A.3 if the following monitoring exceedance occurs:

when six or more 3-hour average values within any 6-month reporting period are outside the range of parameter values established in Condition VII.C.2.

(9 VAC 5-80-110 and 40 CFR 63.864 (c)(2)(v))

- (c) For purposes of determining the number of nonopacity monitoring exceedances, no more than one exceedance will be attributed in any given 24-hour period.  
(9 VAC 5-80-110 and 40 CFR 63.864 (c)(3))

**D. MACT II Recordkeeping**

- 1. Startup, shutdown, and malfunction plan. The permittee must develop and implement a written plan as described in section V of this permit that contains specific procedures to be followed for operating the source and maintaining the source during periods of startup, shutdown, and malfunction, and a program of corrective action for malfunctioning process and control systems used to comply with the standards. In addition to the information required in section V of this permit, the plan must include the following requirements:
  - (a) Procedures for responding to any process parameter level that is inconsistent with the level(s) established under Condition VII.C.2, including the following procedures:
    - (1) Procedures to determine and record the cause of an operating parameter exceedance and the time the exceedance began and ended; and

- (2) Corrective actions to be taken in the event of an operating parameter exceedance, including procedures for recording the actions taken to correct the exceedance.

(b) The following schedules:

- (1) A maintenance schedule for each control technique that is consistent with, but not limited to, the manufacturer's instructions and recommendations for routine and long-term maintenance; and
- (2) An inspection schedule for each continuous monitoring system required under Condition VII.B.1 to ensure, at least once in each 24-hour period, that each continuous monitoring system is properly functioning.

(9 VAC 5-80-110 and 40 CFR 63.866(a))

2. The permittee must maintain records of any occurrence when corrective action is required under Condition VII.C.3(a), and when a violation is noted under Condition VII.C.3(b).

(9 VAC 5-80-110 and 40 CFR 63.866(b))

3. In addition to the general records required by 40 CFR 63.10(b)(2), the permittee must maintain records of the following information

- (a) Records of black liquor solids firing rates in units of tons/day;
- (b) Records of parameter monitoring data required under section VII.B of this permit, including any period when the operating parameter levels were inconsistent with the levels established during the initial performance test, with a brief explanation of the cause of the deviation, the time the deviation occurred, the time corrective action was initiated and completed, and the corrective action taken;
- (c) Records and documentation of supporting calculations for compliance determinations made under VII.C; and
- (d) Records of monitoring parameter ranges established.

(9 VAC 5-80-110 and 40 CFR 63.866(c))

## **E. MACT II Reporting**

1. Notifications. The permittee must submit the applicable notifications from 40 CFR 63 Subpart A, General Provisions, as specified in 40 CFR 63 Subpart A, Table 1, General Provisions Applicability to Subpart MM.

(9 VAC 5-80-110 and 40 CFR 63.867(a))

2. Excess emissions report. The permittee must report quarterly if measured parameters meet any of the conditions specified in Condition VII.C.3(a) or Condition VII.C.3(b). This report must contain the information specified in 40 CFR 63.10(c) as well as the number and duration of occurrences when the source met or exceeded the conditions in Condition VII.C.3(a), and the number and duration of occurrences when the source met or exceeded the conditions in Condition VII.C.3(b). Reporting excess emissions below the violation thresholds of Condition VII.C.3 does not constitute a violation of the applicable standard.
  - (a) When no exceedances of parameters have occurred, the permittee must submit a semiannual report stating that no excess emissions occurred during the reporting period.
  - (b) The permittee for an affected source or process unit subject to the requirements of 40 CFR 63 Subpart MM and 40 CFR 63 Subpart S may combine excess emissions and/or summary reports for the mill.

(9 VAC 5-80-110 and 40 CFR 63.867(c))

## **VIII. Facility Wide Conditions**

### **New source standard for visible emissions**

Unless otherwise specified in this permit, on or after the date on which the performance test required to be conducted by 9 VAC 5-50-30 is completed, no owner or other person shall cause or permit to be discharged into the atmosphere from any affected facility (constructed, modified or relocated after March 17, 1972, or reconstructed on or after December 10, 1976) any visible emissions which exhibit greater than 20% opacity, except for one six-minute period in any one hour of not more than 30% opacity as determined by EPA Method 9 (reference 40 CFR 60, Appendix A). Failure to meet the requirements of this section because of the presence of water vapor shall not be a violation of this section. (9 VAC 5-50-80 and 9 VAC 5-80-110)

## **IX. Permit Shield & Inapplicable Requirements**

Compliance with the provisions of this permit shall be deemed compliance with all applicable requirements in effect as of the permit issuance date as identified in this permit. This permit shield covers only those applicable requirements covered by terms and conditions in this permit and the following requirements which have been specifically identified as being not applicable to this permitted facility:

Citation	Title of Citation	Description of Applicability
None Identified		

Nothing in this permit shield shall alter the provisions of §303 of the federal Clean Air Act, including the authority of the administrator under that section, the liability of the owner for any violation of applicable requirements prior to or at the time of permit issuance, or the ability to obtain information by (i) the administrator pursuant to §114 of the federal Clean Air Act, (ii) the Board pursuant to §10.1-1314 or §10.1-1315 of the



Virginia Air Pollution Control Law or (iii) the Department pursuant to §10.1-1307.3 of the Virginia Air Pollution Control Law.  
(9 VAC 5-80-140)

## **X. General Conditions**

### **A. Enforceability**

All terms and conditions in this permit are enforceable by the administrator and citizens under the federal Clean Air Act, except those that have been designated as only state-enforceable.

(9 VAC 5-80-110 N)

### **B. Permit Expiration**

This permit shall become invalid five years from the date of issuance. Permit expiration terminates the source's right to operate. The permittee shall submit an application for renewal of this permit no earlier than 18 months and no later than six months prior to the date of expiration of this permit. Upon receipt of a complete and timely application for renewal, this source may continue to operate subject to final action by the DEQ on the renewal application.

(9 VAC 5-80-110 D, 9 VAC 5-80-170B, and 9 VAC 5-80-80 F)

### **C. Recordkeeping and Reporting**

1. All records of monitoring information maintained to demonstrate compliance with the terms and conditions of this permit shall contain, where applicable, the following:
  - a. The date, place as defined in the permit, and time of sampling or measurements.
  - b. The date(s) analyses were performed.
  - c. The company or entity that performed the analyses.
  - d. The analytical techniques or methods used.
  - e. The results of such analyses.
  - f. The operating conditions existing at the time of sampling or measurement.

(9 VAC 5-80-110 F)

2. Records of all monitoring data and support information shall be retained for at least five years from the date of the monitoring sample, measurement, report, or application. Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by the permit.

(9 VAC 5-80-110 F)

3. The permittee shall submit the results of monitoring contained in any applicable requirement to DEQ every six months. The time periods to be addressed are the

calendar months January through June, and July through December. Each report must be postmarked within 30 days following each six-month reporting period. This report must be signed by a responsible official, consistent with 9 VAC 5-80-80 G, and shall include:

- a. The time period included in the report.
- b. All deviations from permit requirements. For purposes of this permit, deviations include, but are not limited to:
  - (1) Exceedance of emissions limitations or operational restrictions;
  - (2) Excursions from control device operating parameter requirements, as documented by continuous emission monitoring, periodic monitoring, or compliance assurance monitoring which indicates an exceedance of emission limitations or operational restrictions; or,
  - (3) Failure to meet monitoring, recordkeeping, or reporting requirements contained in this permit.
- c. If there were no deviations from permit conditions during the time period, the permittee shall include a statement in the report that "no deviations from permit requirements occurred during this semi-annual reporting period."

(9 VAC 5-80-110 F)

#### **D. Annual Compliance Certification**

Exclusive of any reporting required to assure compliance with the terms and conditions of this permit or as part of a schedule of compliance contained in this permit, the permittee shall submit to DEQ and EPA a certification of compliance with all terms and conditions of this permit including emission limitation standards or work practices. The time period to be covered by the certification is the calendar months January through December. Each report must be postmarked within 30 days following each annual period. The compliance certification shall comply with such additional requirements that may be specified pursuant to §114(a)(3) and §504(b) of the federal Clean Air Act. This certification shall be signed by a responsible official, consistent with 9 VAC 5-80-80 G, and shall include:

1. The time period included in the certification.
2. The identification of each term or condition of the permit that is the basis of the certification.
3. The compliance status.
4. The identification of the methods or other means used by the permittee for determining the compliance status with each term and condition during the

certification period, and whether such methods or other means provide continuous or intermittent data.

5. Such other facts as the permit may require to determine the compliance status of the source.

One copy of the annual compliance certification shall be sent to EPA at the following address:

Clean Air Act Title V Compliance Certification (3AP00)  
U. S. Environmental Protection Agency, Region III  
1650 Arch Street  
Philadelphia, PA 19103-2029.

(9 VAC 5-80-110 K.5)

#### **E. Permit Deviation Reporting**

The permittee shall notify the South Central Regional Office, within four daytime business hours of any deviations from permit requirements which may cause excess emissions for more than one hour, including those attributable to upset conditions as may be defined in this permit. In addition, within 14 days of the occurrence, the permittee shall provide a written statement explaining the problem, any corrective actions or preventative measures taken, and the estimated duration of the permit deviation. The occurrence should also be reported in the next semi-annual compliance monitoring report pursuant to General Condition X.C.3.

(9 VAC 5-80-110 F.2 and 9 VAC 5-80-250)

#### **F. Failure/Malfunction Reporting**

If, for any reason, the affected facilities or related air pollution control equipment fails or malfunctions and may cause excess emissions for more than one hour, the owner shall notify the South Central Regional Office, within four (4) daytime business hours of the occurrence. In addition, the owner shall provide a written statement, within 14 days, explaining the problem, corrective action taken, and the estimated duration of the breakdown/shutdown.

(9 VAC 5-80-250)

#### **G. Severability**

The terms of this permit are severable. If any condition, requirement or portion of the permit is held invalid or inapplicable under any circumstance, such invalidity or inapplicability shall not affect or impair the remaining conditions, requirements, or portions of the permit.

(9 VAC 5-80-110 G.1)

## **H. Duty to Comply**

The permittee shall comply with all terms and conditions of this permit, including those terms and conditions set forth in a tabular format. Any permit noncompliance constitutes a violation of the federal Clean Air Act or the Virginia Air Pollution Control Law or both and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or, for denial of a permit renewal application.  
(9 VAC 5-80-110 G.2)

## **I. Need to Halt or Reduce Activity not a Defense**

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.  
(9 VAC 5-80-110 G.3)

## **J. Permit Action for Cause**

1. This permit may be modified, revoked, reopened, and reissued, or terminated for cause as specified in 9 VAC 5-80-110 L, 9 VAC 5-80-240 and 9 VAC 5-80-260. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition.  
(9 VAC 5-80-110 G.4)
2. Such changes that may require a permit modification and/or revisions include, but are not limited to, the following:
  - a. Erection, fabrication, installation, addition, or modification of an emissions unit (which is the source, or part of it, which emits or has the potential to emit any regulated air pollutant), or of a source, where there is, or there is potential of, a resulting emissions increase;
  - b. Reconstruction or replacement of any emissions unit or components thereof such that its capital cost exceeds 50% of the cost of a whole new unit;
  - c. Any change at a source which causes emission of a pollutant not previously emitted, an increase in emissions, production, throughput, hours of operation, or fuel use greater than those allowed by the permit, or by 9 VAC 5-80-11, unless such an increase is authorized by an emissions cap; or any change at a source which causes an increase in emissions resulting from a reduction in control efficiency, unless such an increase is authorized by an emissions cap;
  - d. Any reduction of the height of a stack or of a point of emissions, or the addition of any obstruction which hinders the vertical motion of exhaust;
  - e. Any change at the source which affects its compliance with conditions in this permit, including conditions relating to monitoring, recordkeeping, and reporting;

- f. Addition of an emissions unit which qualifies as insignificant by emissions rate (9 VAC 5-80-720 B) or by size or production rate (9 VAC 5-80-720 C);
- g. Any change in insignificant activities, as defined by 9 VAC 5-80-90 D.1.a(1) and 9 VAC 5-80-720 B and 9 VAC 5-80-720 C.

(9 VAC 5-80-110 G, 9 VAC 5-80-110 J, 9 VAC 5-80-240, and 9 VAC 5-80-260)

#### **K. Property Rights**

The permit does not convey any property rights of any sort, or any exclusive privilege. (9 VAC 5-80-110 G.5)

#### **L. Duty to Submit Information**

- 1. The permittee shall furnish to the Board, within a reasonable time, any information that the Board may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the Board copies of records required to be kept by the permit and, for information claimed to be confidential, the permittee shall furnish such records to the Board along with a claim of confidentiality. (9 VAC 5-80-110 G.6)
- 2. Any document (including reports) required in a permit condition to be submitted to the Board shall contain a certification by a responsible official that meets the requirements of 9 VAC 5-80-80 G. (9 VAC 5-80-110 K.1)

#### **M. Duty to Pay Permit Fees**

The owner of any source for which a permit under 9 VAC 5-80-50 through 9 VAC 5-80-305 was issued shall pay permit fees consistent with the requirements of 9 VAC 5-80-310 through 9 VAC 5-80-355. The actual emissions covered by the permit program fees for the preceding year shall be calculated by the owner and submitted to the Department by **April 15** of each year. The calculations and final amount of emissions are subject to verification and final determination by the Department. (9 VAC 5-80-110 H and 9 VAC 5-80-340 C)

#### **N. Fugitive Dust Emission Standards**

During the operation of a stationary source or any other building, structure, facility, or installation, no owner or other person shall cause or permit any materials or property to be handled, transported, stored, used, constructed, altered, repaired, or demolished without taking reasonable precautions to prevent particulate matter from becoming airborne. Such reasonable precautions may include, but are not limited to, the following:

1. Use, where possible, of water or chemicals for control of dust in the demolition of existing buildings or structures, construction operations, the grading of roads, or the clearing of land;
2. Application of asphalt, water, or suitable chemicals on dirt roads, materials stockpiles, and other surfaces which may create airborne dust; the paving of roadways and the maintaining of them in a clean condition;
3. Installation and use of hoods, fans, and fabric filters to enclose and vent the handling of dusty material. Adequate containment methods shall be employed during sandblasting or other similar operations;
4. Open equipment for conveying or transporting material likely to create objectionable air pollution when airborne shall be covered or treated in an equally effective manner at all times when in motion; and,
5. The prompt removal of spilled or tracked dirt or other materials from paved streets and of dried sediments resulting from soil erosion.

(9 VAC 5-50-90)

#### **O. Startup, Shutdown, and Malfunction**

At all times, including periods of startup, shutdown, soot blowing, and malfunction, owners shall, to the extent practicable, maintain and operate any affected facility including associated air pollution control equipment in a manner consistent with air pollution control practices for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Board, which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.

(9 VAC 5-50-20)

#### **P. Inspection and Entry Requirements**

The permittee shall allow DEQ, upon presentation of credentials and other documents as may be required by law, to perform the following:

1. Enter upon the premises where the source is located or emissions-related activity is conducted, or where records must be kept under the terms and conditions of the permit.
2. Have access to and copy, at reasonable times, any records that must be kept under the terms and conditions of the permit.
3. Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit.

4. Sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the permit or applicable requirements.

(9 VAC 5-80-110 K.2)

#### **Q. Reopening For Cause**

The permit shall be reopened by the Board if additional federal requirements become applicable to a major source with a remaining permit term of three years or more. Such reopening shall be completed no later than 18 months after promulgation of the applicable requirement. No such reopening is required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions has been extended pursuant to 9 VAC 5-80-80 F.

1. The permit shall be reopened if the Board or the administrator determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit.
2. The permit shall be reopened if the administrator or the Board determines that the permit must be revised or revoked to assure compliance with the applicable requirements.
3. The permit shall not be reopened by the Board if additional applicable state requirements become applicable to a major source prior to the expiration date established under 9 VAC 5-80-110 D.

(9 VAC 5-80-110 L)

#### **R. Permit Availability**

Within five days after receipt of the issued permit, the permittee shall maintain the permit on the premises for which the permit has been issued and shall make the permit immediately available to DEQ upon request.

(9 VAC 5-80-150 E)

#### **S. Transfer of Permits**

1. No person shall transfer a permit from one location to another, unless authorized under 9 VAC 5-80-130, or from one piece of equipment to another.  
(9 VAC 5-80-160)
2. In the case of a transfer of ownership of a stationary source, the new owner shall comply with any current permit issued to the previous owner. The new owner shall notify the Board of the change in ownership within 30 days of the transfer and shall comply with the requirements of 9 VAC 5-80-200.  
(9 VAC 5-80-160)

3. In the case of a name change of a stationary source, the owner shall comply with any current permit issued under the previous source name. The owner shall notify the Board of the change in source name within 30 days of the name change and shall comply with the requirements of 9 VAC 5-80-200.  
(9 VAC 5-80-160)

#### **T. Malfunction as an Affirmative Defense**

1. A malfunction constitutes an affirmative defense to an action brought for noncompliance with technology-based emission limitations if the conditions of paragraph 2 are met.
2. The affirmative defense of malfunction shall be demonstrated by the permittee through properly signed, contemporaneous operating logs, or other relevant evidence that show the following:
  - a. A malfunction occurred and the permittee can identify the cause or causes of the malfunction.
  - b. The permitted facility was at the time being properly operated.
  - c. During the period of malfunction, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements in the permit.
  - d. For malfunctions that occurred for one hour or more, the permittee submitted to the Board by the deadlines described in **Failure/Malfunction Reporting** above, a notice and written statement containing a description of the malfunction, any steps taken to mitigate emissions, and corrective actions taken. The notice fulfills the requirement of 9 VAC 5-80-110 F.2.b to report promptly deviations from permit requirements.
3. In any enforcement proceeding, the permittee seeking to establish the occurrence of a malfunction shall have the burden of proof. The provisions of this section are in addition to any malfunction, emergency or upset provision contained in any requirement applicable to the source.

(9 VAC 5-80-250)

#### **U. Permit Revocation or Termination for Cause**

A permit may be revoked or terminated prior to its expiration date if the owner knowingly makes material misstatements in the permit application or any amendments thereto or if the permittee violates, fails, neglects or refuses to comply with the terms or conditions of the permit, any applicable requirements, or the applicable provisions of 9 VAC 5 Chapter 80 Article 1. The Board may suspend, under such conditions and for



such period of time as the Board may prescribe, any permit for any of the grounds for revocation or termination or for any other violations of these regulations.  
(9 VAC 5-80-260)

#### **V. Duty to Supplement or Correct Application**

Any applicant who fails to submit any relevant facts or who has submitted incorrect information in a permit application shall, upon becoming aware of such failure or incorrect submittal, promptly submit such supplementary facts or corrections. An applicant shall also provide additional information as necessary to address any requirements that become applicable to the source after the date a complete application was filed but prior to release of a draft permit.  
(9 VAC 5-80-80 E)

#### **W. Stratospheric Ozone Protection**

If the permittee handles or emits one or more Class I or II substances subject to a standard promulgated under or established by Title VI (Stratospheric Ozone Protection) of the federal Clean Air Act, the permittee shall comply with all applicable sections of 40 CFR Part 82, Subparts A to F.  
(40 CFR Part 82, Subparts A-F)

#### **X. Accidental Release Prevention**

If the permittee has more, or will have more than a threshold quantity of a regulated substance in a process, as determined by 40 CFR 68.115, the permittee shall comply with the requirements of 40 CFR Part 68.  
(40 CFR Part 68)